

Date: Friday, 24/04/2009 8:37:43 AM
 User: Chantal Lavoie

Process Sheet

Customer : CU-DAR001 Dart Helicopters Services Drawing Name : SADDLE BILLET
 Job Number : 47460
 Estimate Number : 13880
 P.O. Number :
 This Issue : 24/04/2009 S.O. No. :
 Prsht Rev. : NC
 First Issue : 24/04/2009 Type : PURCHASED PARTS
 Previous Run :
 Written By :
 Checked & Approved By : C209/04/24
 Comment : Est Rev:A New Issue 09-04-23 JLM Verified By:EC

Part Number : D6101017
 Drawing Number : D6101 PREL
 Project Number : N/A
 Drawing Revision : PREL
 Material :
 Due Date : 08/05/2009 Qty: 10 Um: Each

POSITIVE RECALL

Additional Product

Job Number:



PRELIMINARY ISSUE

Seq. #: Machine Or Operation: Description :

1.0 PG PURCHASING



Comment: PURCHASING

Issue P/O: 86431

C209/04/24

a) Description: Aluminum billet

b) 6.350" x 6.250" x 2.250" thick

c) Tolerance on all dimensions are +0.030"/-0.000"

d) Grain direction along 6.350" length

e) Material: 7075-T7351 (QQ-A-250/12)

f) Material certification required

(10)

2.0 D6101017P Saddle Billet



Comment: Qty.: 1.0000 Each(s)/Unit Total : 10.0000 Each(s)
 Saddle Billet

3.0 PACKAGING 1 PACKAGING RESOURCE #1



Comment: PACKAGING RESOURCE #1

Receive & Inspect For Transit Damage

Ensure material certification is attached

C209/04/24 (10)

4.0 QC6 DIMENSIONAL CHECK



Comment: DIMENSIONAL CHECK

Ensure Material certification comply to Dwg D6101

C209/04/24 (10)

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Date: Friday, 24/04/2009 8:37:43 AM
User: Chantal Lavoie

Process Sheet

Customer: CU-DAR001 Dart Helicopters Services

Drawing Name: SADDLE BILLET

Job Number: 47460

Part Number: D6101017

Job Number:



Seq. #:

Machine Or Operation:

Description :

5.0

PACKAGING 1

PACKAGING RESOURCE #1



Comment: PACKAGING RESOURCE #1

Identify and Stock

Location: _____

Regis *W*

6.0

QC21

FINAL INSPECTION/W/O RELEASE



09/09/02 *A*

Comment: FINAL INSPECTION/W/O RELEASE

Job Completion



MF *69-05-10*

POSITIVE RECALL
EFFECTIVE *04/24* AUTH *u*
RELEASED *18* DATE *09.09.08*

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

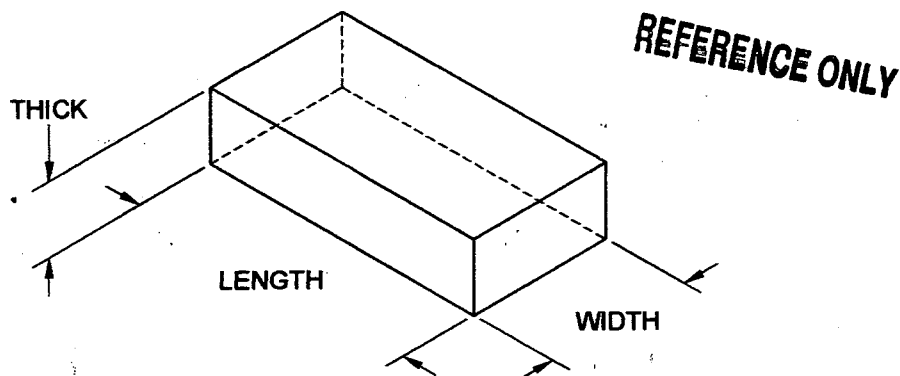
Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

Resolution: _____ Disposition: _____ QA: N/C Closed: _____ Date: _____

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

SPECIFICATION CONTROL DRAWING



PURCHASE MATERIAL ACCORDING TO THE FOLLOWING TABLE. SPECIFY ALLOY, LENGTH x WIDTH x THICK (+0.030/-0.000), AND GRAIN DIRECTION AS SHOWN.

TOLERANCES ON ALL DIMENSIONS ARE +0.030/-0.000.

ALL DIMENSIONS ARE IN INCHES.

B ACCEPTABLE SPECIFICATIONS FOR 7075-T7351 ALUMINUM ARE AMS-QQ-A-250/12, QQ-A-250/12, OR ASTM B209

Part No.	Alloy	Length	Width	Thick	Grain Direction
D6101-001	7075-T7351 (QQ-A-250/12)	6.000	6.250	2.000	Along 6.000 Length
D6101-003	7075-T7351 (QQ-A-250/12)	7.875	6.250	2.000	Along 7.875 Length
D6101-005	7075-T7351 (QQ-A-250/12)	5.000	8.250	2.500	Along 5.000 Length
D6101-007	7075-T7351 (QQ-A-250/12)	7.750	8.250	2.500	Along 7.750 Length
D6101-009	7075-T7351 (QQ-A-250/12)	8.700	8.250	2.500	Along 8.700 Length
D6101-011	7075-T7351 (QQ-A-250/12)	9.700	8.250	2.500	Along 9.700 Length
D6101-013	7075-T7351 (QQ-A-250/12)	10.100	8.250	2.500	Along 10.10 Length
D6101-015	7075-T7351 (QQ-A-250/12)	9.450	6.250	2.500	Along 9.450 Length
D6101-017	7075-T7351 (QQ-A-250/12)	6.350	6.250	2.250	Along 6.350 Length

C 209/04/24
W 10.47460

B	ADDED D6101-015/-017, ADD ASTM B209	RF	09.04.23
A	NEW ISSUE	CP	01.03.30
REV.	DESCRIPTION	BY	DATE
DESIGN	CP	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	RF		
CHECKED		DRAWING NO.	REV. B
MFG. APPR.		D6101	SHEET 1 OF 1
APPROVED		TITLE	SCALE
DE APPR.		SADDLE BILLET, 7075	NTS
DATE	09.04.23	<small>COPYRIGHT © 2001 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.</small>	

**Castle Metals®**

A. M. Castle & Co.

BORDEREAU DE MARCHANDISES

Page 1 of 1

No de Formulaire d'Emballage / Pack Slip No: 37432

Expédié de / Ship From: Castle Metals Montreal 835-Selkirk Avenue Pointe Claire, QUEBEC H9R 3S2		Vendu à / Sold To: DART AEROSPACE LTD 1270 ABERDEEN HAWKESBURY, ON K6A 1K7		Expédié à / Ship To: DART AEROSPACE LTD 1270 ABERDEEN HAWKESBURY, ON K6A 1K7		Livré à / Deliver To:	
Date d'expédition / Date Shipped	F.O.B.	Modalités de transport / Freight Terms		Transporteur / Carrier	N° du Bon de connaissance / BOL No	N° de livraison / Delivery No	
06-MAY-09	ORIGIN	Prepaid		Manitoulin	36108	2508866	

Détails d'expédition / Shipment Details				Destination finale / Final Destination Branch -			
N° de commande / Order No	N° de ligne / Line No	N° d'article / Item No		Description			
191995	2	24866.MO		2.2500.PL.7075.T7351.ALUMINUM/48.5000.144.5000 CUT 2SIDED TO 6.25 IN () X 6.35 IN ()			
N° de bon de commande / Purchase Order No		Nbre de pièces / Part Number		Qté commandée / Ordered Qty	Qté Facturée / Invoice Qty	Solde à livrer / Backorder Qty	
8643				10 PCS	10 PCS		
Détails / Details							
Usine / Mill		No de coulee / Heat Number	Code méc / Mech Id	Pièces / PCS	Largeur (Pouce) / Width (IN)	Longueur (Pouce) / Length (IN)	Qté expédiée / Shipped Qty (LBS)
		350451		10			90.61

Ces marchandises/technologies sont sujettes aux règlements de l'Export Administration et du département d'Etat des Etats-Unis. Si elles ont été/sont exportées, elles doivent se conformer à ces règlements. Toute modification du contrat de transport contraire aux lois des Etats-Unis est interdite.
These commodities/technologies are subject to US Export Administration & US State Dept. Regulations and, if intended for export, were/are exported thereunder. Diversion contrary to US Law is Prohibited.

Nous certifions par la présente que le matériel couvert par cette certification est conforme aux spécifications susmentionnées et aux exigences applicables pour le matériel, y compris toute spécification faisant partie de la description. Les rapports d'essai sont archivés pour fins de consultation. Toute requête concernant du matériel défectueux sera rejetée à moins qu'elle ne soit faite par écrit à A. M. Castle & Co. dans les 60 jours suivant la livraison. Le matériel coupé sur mesure ou coupé par le client ne peut être retourné pour crédit.
We hereby certify the material covered by this certification conforms in accordance with the above specifications and has been found to meet the applicable requirements for the material, including any specifications forming a part of the description. Test reports are on file subject to examination. All claims for defective material are waived unless made in writing to A.M. Castle & Co. within 60 days of the shipment. Material cut to the correct size, or material cut by the customer cannot be returned for credit.

Ce matériel a été reçu et inspecté par This material has been received and inspected by:	Date:
---	-------

ALCAN
ROLLED PRODUCTS

CERTIFIED TEST REPORT

RAVENSWOOD, WV 26164 USA

A M CASTLE & CO
3400 NO WOLF ROAD
FRANKLIN PARK IL

60131

A M CASTLE & CO
3400 NO WOLF ROAD
FRANKLIN PARK IL

60131

A M CASTLE A60705 1512 INCLUSION SERIAL#: 20070507A60705 PAGE 1 OF 2

CUSTOMER PURCHASE ORDER NO. & ITEM				ALCAN ORDER NO.	
01-84321				113-581189	
ALLOY	CLAD.	TEMPER	GAUGE	WIDTH	LENGTH
7075	00	T7351	2.25000	48.500	144.500
ITEM ORDERED					
DIST. AEROSPACE/COMM. SPEC PLATE, SAWED MILL					
CUSTOMER SPECIFICATION					
AMS-QQ-A-250/121					
PART NUMBER		B/L NUMBER		DATE SHIPPED	
		A60700		05/08/07	
WEIGHT SHIPPED		NO. OF PIECES		GOVT. CONTRACT NO.	
12,960		8			

CERTIFICATION

"ALCAN Rolled Products, hereby certifies that metal shipped under this order has been inspected and found in conformance with the requirements of the applicable specifications as indicated herein. Any warranty is limited to that shown on ALCAN Rolled Products' standard General Terms and Conditions of Sales. Test reports are on file, subject to examination."

ALCAN ROLLED PRODUCTS

P.O. BOX 68

RAVENSWOOD, WV 26164 USA

 LaDonna B. Smith - Quality Manager

LOT NUMBER	TEST DIRECTION	NO. OF TESTS	ULTIMATE STRENGTH K.S.I.		YIELD STRENGTH K.S.I.		ELONGATION %		COND % IACS											
			MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN	MAX										
350451	LT	2	70.3	71.4	58.8	60.4	11.5	11.5	40.6	40.6										
350452	LT	2	69.7	70.4	57.9	59.4	11.5	12.0	41.6	41.6										
ALL LOTS ON THIS CERTIFICATION ALSO CONFORM TO THE FOLLOWING REQUIREMENTS																				
AMS-STD-2154 100% SONIC MINUS DEAD ZONE CLASS A																				
ALSO CONFORMS TO AMS 4078F, ASTM B209-04																				
ALSO CONF TO ASTM B594, BSS 7055 CL A SONICS																				
CASTLE METALS CORP. DATE RCVD 5/10/07 AC 24866 APPROVED BY [Signature]																				
CHEM COM	ALLOY	SILICON		IRON		COPPER		MANGANESE		MAGNESIUM		CHROMIUM		ZINC		TITANIUM		OTHERS		
		MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	EACH MAX.	TOTAL MAX.	
		SEE ACTUAL CHEMICAL COMPOSITION																		
ALUMINUM REMAINDER																				

ALCAN
ROLLED PRODUCTS

CERTIFIED TEST REPORT

RAVENSWOOD, WV 26164 USA

A M CASTLE & CO
3400 NO WOLF ROAD
FRANKLIN PARK IL

60131

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A M CASTLE A60705 1512 INCLUSION SERIAL#: 20070507A60705 PAGE 2 OF 2

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7075	00	T7351	2.2500	48.500	144.500
ITEM ORDERED					
DIST. AEROSPACE/COMM. SPEC PLATE, SAWED MILL					
CUSTOMER SPECIFICATION					
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ALCAN ROLLED PRODUCTS

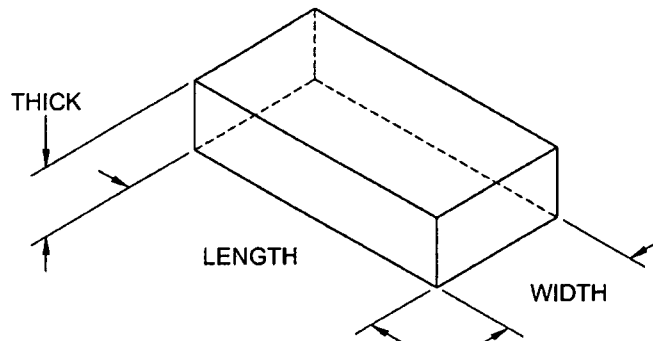
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LOT NUMBER	TEST DIRECTION	NO. OF TESTS	ULTIMATE STRENGTH K.S.I.		YIELD STRENGTH K.S.I.		ELONGATION %		COND % IACS										
			MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN	MAX									
350451 C SI= 0.07 FE= 0.18 CU= 1.46 MN= 0.08 MG= 2.55 CR= 0.19 ZN= 5.44 TI= 0.02 OTHERS-EACH: .05 MAX. OTHERS TOTAL: .15 MAX. AL REMAINDER																			
350452 C SI= 0.07 FE= 0.16 CU= 1.40 MN= 0.06 MG= 2.45 CR= 0.21 ZN= 5.58 TI= 0.02 OTHERS-EACH: .05 MAX. OTHERS TOTAL: .15 MAX. AL REMAINDER																			
THIS TEST REPORT SHALL NOT BE REPRODUCED EXCEPT IN FULL, WITHOUT THE WRITTEN APPROVAL OF THE LABORATORY OR AUTHORIZED QUALITY DELEGATE. THE RECORDING OF FALSE, FICTITIOUS, OR FRAUDULENT STATEMENTS OR ENTRIES ON THE CERTIFICATE MAY BE PUNISHED AS A FELONY UNDER FEDERAL LAW.																			
CHEMISTRY BY OES: ARKSPARK																			
CHEMISTRIES REPORTED IN PERCENTAGE BY WEIGHT.																			
WHEN FRACTURE TOUGHNESS TEST REQUIRED, TESTED PER ASTM E399.																			
WHEN TENSILE TEST REQUIRED, TESTED PER ASTM E8; B557.																			
"END OF CERTIFICATION"																			
CHEM COM P	ALLOY	SILICON		IRON		COPPER		MANGANESE		MAGNESIUM		CHROMIUM		ZINC		TITANIUM		OTHERS	
		MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	MIN.	MAX.	EACH MAX.	TOTAL MAX.
		SEE ACTUAL CHEMICAL COMPOSITION																	
ALUMINUM REMAINDER																			

SPECIFICATION CONTROL DRAWING



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D6101-005	7075-T7351 (QQ-A-250/12)	5.000	8.250	2.500	Along 5.000 Length
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D6101-009	7075-T7351 (QQ-A-250/12)	8.700	8.250	2.500	Along 8.700 Length
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D6101-017	7075-T7351 (QQ-A-250/12)	6.350	6.250	2.250	Along 6.350 Length

B

RELEASED
09/07/15/NW

B	ADDED D6101-015/-017, ADD ASTM B209	RF	09.04.23
A	NEW ISSUE	CP	01.03.30
REV.	DESCRIPTION	BY	DATE
DESIGN	CP	DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA	
DRAWN	RF		
CHECKED	<i>[Signature]</i>	DRAWING NO.	REV. B
MFG. APPR.	<i>[Signature]</i>	D6101	SHEET 1 OF 1
APPROVED	<i>[Signature]</i>	TITLE	SCALE
DE APPR.	<i>[Signature]</i>	SADDLE BILLET, 7075	NTS
DATE	09.04.23	<small>COPYRIGHT © 2001 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD.</small>	